



SUBSTITUTE SPECIFICATION

5 **TITLE OF THE INVENTION:**

Nectarine Tree 'S 6816'

CROSS REFERENCE TO RELATED APPLICATIONS:

None

10

PRIORITY CLAIM:

This application claims priority of U.S. Provisional patent application Ser. No. 60/404,217 filed August 15, 2002.

15 **STATEMENT REGARDING FEDERALLY SPONSORED RESEARCH OR
DEVELOPMENT:**

None

LATIN NAME OF THE GENUS AND SPECIES OF THE PLANT CLAIMED:

20 *Prunus persica* L. Batsch.

VARIETY DENOMINATION:

'S 6816'

BACKGROUND OF THE INVENTION

The new nectarine tree 'S 6816' was developed by the Institut National de la Recherche Agronomique (INRA) at Angers, France, as part of a controlled breeding program. 'S 6816' was asexually propagated by budding at Angers, France, and has been observed to remain true to type
5 over successive asexually propagated generations.

BRIEF SUMMARY OF THE INVENTION

'S 6816' was selected for its suitability as a commercial nectarine tree cultivar. Fruit of the 'S 6816' cultivar matures in late July in central Washington state, and is notable for its
10 aromatic and sweet yellow flesh. This variety is distinguishable over related variety 'S 6817' (U.S. Patent Application Ser. No. 10/642,441) by its earlier maturity date and smaller and sweeter fruit.

BRIEF DESCRIPTION OF THE PHOTOGRAPHS:

15 FIG. 1 shows branches and blossoms of the new cultivar;
FIG. 2 shows a tree of the new cultivar;
FIG. 3 shows leaves of the new cultivar;
FIG. 4 shows a leaf, a stone, and a portion of a fruit of the new cultivar;
FIG. 5 shows fruit of the new cultivar; and
20 FIG. 6 shows a sectioned fruit of the new cultivar.

DETAILED BOTANICAL DESCRIPTION OF THE VARIETY:

The following is a detailed botanical description of ‘S 6816,’ a new and distinct nectarine tree, based on observations made during the 2004 growing season, of specimens planted at Parker, Washington, USA, in 1999. The described trees were grown on ‘Lovell’ (not patented) rootstock. All colors are described according to the Royal Horticultural Society Color Chart. It should be understood that the botanical and analytical characteristics described will vary somewhat depending upon cultural practices and climatic conditions, and can vary with location and season. Quantified measurements are expressed as an average of measurements taken from a number of individual plants of the new variety. The measurements of any individual plant, or any group of plants, of the new variety may vary from the stated average.

Tree

| | |
|----------|--|
| Size | Large, width 2.2 m wide, height 3.4 m |
| Vigor | Strong |
| Habit | Upright |
| Trunk | Diameter 31 cm at soil level; very rough; overcolor grey 201D; undercolor grey 175A; lenticels prominent, 0.3 to 0.5 cm, yellow 159A |
| Branches | Smooth, greyed red 181A, internode length 3.1 to 3.8 cm, lateral branch diameter 1.8 cm, length 46.2 cm (previous season growth) |

Leaves

| | |
|---------------------------------|--------|
| Young shoot - length of stipule | Medium |
|---------------------------------|--------|

| | | |
|----------------|-----------------------|--|
| | Size | Length 10.5 cm; 4.0 cm |
| | Ratio length to width | Medium |
| | Shape | Lanceolate, base rounded, apex acuminate, recurved, cross section concave |
| 5 | Color | Upper surface green 146A, lower surface green N144A, upper venation color green 154D |
| | Texture | Smooth |
| | Margin | Serrate to serrulate |
| Petiole | | |
| 10 | Size | Length 1.5 cm, diameter 0.2 cm |
| | Color | Green 154D |
| | Glands | Present, usually 2, reniform |
| Flowers | | |
| 15 | Bud | Length 0.9 to 1.1 cm, round, smooth, hardy, red-purple 59A, tip pink 62A |
| | Bud burst | March 18 at Parker, Washington |
| | Bloom period | March 18 to April 7 at Parker, Washington |
| | Flower type | Showy, fragrant, 1 to 4 per cluster |
| 20 | Petals | Quantity 5; length 1.8 to 2.1 cm, width 1.3 to 1.5 cm; margins ruffled, overlapping; shape obovate to rotund; color pink 69A |
| | Sepals | Length 0.5 to 0.6 cm; width 0.4 to 0.5 cm; color red-purple |

| | | |
|----|--|--|
| | | 59A |
| | Flower size | Diameter 3.5 to 3.7 cm |
| 5 | Reproductive organs | Staymen white 155D, quantity 39, length 1.0 to 1.3 cm; anther length 0.5 cm, brown 199A; filament 0.9 to 1.2 cm; pistil 0.9 to 1.0 cm, smooth, yellow 3A |
| | Pollen | Scarce, yellow 1A |
| | Fruit | |
| | Size | Small, diameter 70 mm, height 4.0 cm |
| | Shape (ventral view) | Broad oblate |
| 10 | Shape of pistil end | Weakly depressed |
| | Symmetry | Symmetric |
| | Prominence of suture | Weak |
| | Depth of stalk cavity | Shallow, 0.5 cm |
| | Width of stalk cavity | Broad, 2.8 cm |
| 15 | Skin | Color: ground color orange-red 34C, over color red-purple 59A; thin, smooth, tenacious |
| | Pubescence | Absent |
| | Firmness of flesh | Soft |
| | Ground color of flesh | Yellow-orange 17C |
| 20 | Anthocyanin coloration directly under skin | Absent or very weakly expressed |
| | Anthocyanin coloration of flesh | Absent or very weakly expressed |
| | Anthocyanin coloration around stone | Weakly expressed |

| | |
|------------------|----------------------|
| Texture of flesh | Not fibrous |
| Sweetness | Very sweet, 12° Brix |
| Acidity | Low |

Stone

| | | |
|---|---------------------------------------|--|
| 5 | Size | Small, diameter 3.0 cm |
| | Shape in lateral view | Oblate |
| | Color | Red-purple 59C |
| | Relief of surface | Small pits, ridges |
| | Tendency of splitting at peak harvest | Absent or very low |
| 10 | Adherence to flesh | Absent (freestone) |
| Time of maturity for consumption | | Early, late July in Parker, Washington |
| Tendency to preharvest drop | | Absent or very weak |
| Resistance to diseases and pests | | None observed |
| Heat and cold tolerance | | Tolerant in area tested (USDA Zone 6) |